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## 105. Sweetheart Lake stocking

Sockeye fry are stocked in Sweetheart Lake, which is a barriered system in Port Snettisham. The outlet creek cascades down a 500-foot fall before entering salt water. Investigations completed in 1993 indicated that 60% of sockeye smolts leaving the lake survived this drop, which is an acceptable mortality in terms of the applicable enhancement technique (i.e., fry planting). The first adults returned in 1993. Further sockeye fry plants are scheduled to continue at Sweetheart lake. This project could produce an additional return to Gilbert Bay of between 20,000 and 60,000 adult sockeyes per year. As the 5,000,000 smolt level is reached, adult production should double; however, additional evaluation is needed to meet full production, and it is likely that lake fertilization would be needed.